Financial development institutions: lessons from international experiences

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This text is a full translation from the original article, “Instituições financeiras de desenvolvimento: revisitando lições das experiências internacionais” published in Portuguese in the *Revista do BNDES 48*, in December 2017.

Abstract

Development financial institutions around the world are shifting towards greater transparency, better governance and greater social and environmental responsibility. At the center of these changes is the relationship of each of these institutions with their State (shareholder) in what it refers to operational and financial autonomy, taxation and distribution of profits and dividends. Despite the specificities of each relationship, some combinations of operational and financial autonomy and corporate responsibility provide these institutions with better performance and institutional stability to carry out its mandate with a long-term perspective. In Brazil, BNDES follows this renewal movement.

Keywords: BNDES; Development bank; Development financial institution; Long-term financing; State-owned bank.

Introduction

The role of development financial institutions (DFI) is changing. Not with regard to their ultimate goals of financing the economic and social development that will promote better living conditions in their countries. However, the way to achieve this development lies at the heart of the intense restructuring that a large number of DFIs in the world are experiencing. The main point is that all efforts and resources should be directed towards sustainable economic and social growth, to the maximum extent. DFIs should establish their actions today taking into account the concern for the long-term well-being of the local and global population.

All the economic sectors are being affected by the new demands of a society that asks for their authorities' commitment to the improvement of life conditions. The industry must provide innovative technologies appropriate to the new demands of the population, while the services sector must provide knowledge, human skills and management of institutions renewed by high technology. The alignment with the goals of environmental improvement on an international scale propels new clean technologies, the development of a sustainable infrastructure, an urban planning that reconfigures the way of life of the cities, and a scientific and environmentally clean agriculture.

In pursuit of an economic growth that is in harmony with a sustainable development, the DFIs are being renewed. The environment conducive to change also requires greater transparency, greater effectiveness and greater commitment of DFIs to socioenvironmental outcomes. In the center of these transformations are their fiscal relationship with the state and their governance. A responsible and effective corporate relationship can create the conditions for these institutions to migrate to the new economy along with their clients and in line with what their societies desire.

The aim of this article[1] is to present some recent international experiences that reinforce the importance of DFIs in the economy, both in a crisis environment and in the midst of a technological change. The relationship with the State, the governance structure, the concern with profitability and with the technical, economic and socioenvironmental feasibility are the starting points for the DFIs' adaptation to the future wanted and required of them.

In the next section, we review the role of the DFIs, highlighting the contribution of other BNDES specialists to the importance of the development function of a financial institution, a theme that is proposed as the basic premise in this study. Also worthy of note are the views of the European Commission and the United Nations on the relevance of DFIs in an environment of economic crisis. In the third section, we discuss the relationship of some institutions with the State regarding sources of funding, state guarantee, dividends, taxation and regulation. In the fourth section, we point out some lessons that can be learned from international experiences, so that, in the fifth section, some aspects of the ongoing renewal in BNDES, associated with the good international practices of DFI governance, can be presented. The brief conclusions summarize the practices that are considered good experiences to be replicated.

1 The report sent to ABDE — *Estratégia para tratamento fiscal diferenciado às agências financeiras oficiais de fomento* (*Strategy for Differential Tax Treatment to Official Financial Development Agencies*) — was based in a questionnaire answered by the listed foreign institutions in order to develop a strategic approach for regional development agencies associated with ABDE.

The role of DFIs

Basic definitions

According to Além and Madeira (2015), the need for State intervention in the financial market arises from the perception, by public agents, that the market will not operate efficiently if guided freely by its own forces. Not only because the financial market is subject to certain failures or limitations, but also because intrinsic structural problems, such as the presence of uncertainty, confidence crisis between agents and economic cycles provoked by instability of expectations.

To be efficient, a financial system must be functional regarding economic development, that is, it must support productive investment, the pillar of economic growth. This functionality needs to be built up by public policy, through a regulatory apparatus and by the creation of institutions, structures and instruments for the provision of adequate financial resources for investment.

Além and Madeira (2015) point out that, although there is no consensus in literature on the definition of DFIs, the most commonly adopted concept encompasses development banks and other institutional structures, such as development agencies, export credit agencies (ECA) and international cooperation agencies. It also includes hybrid institutions with similar initiatives and characteristics to development banks that provide long-term financing for specific segments, such as multiple public banks and pension fund or savings deposits institutions.

In general, DFIs are public and usually focus on financing investment projects through long-term maturing loans, some of which also provide guarantees and insurance, capital inflows into companies, and export financing of goods and services. They function in a complementary way to the private market, and most of them operate indirectly through private financial institutions, while others operate directly in specific segments. DFIs can be regional, national or multilateral.

According to Aronovich and Fernandes (2006), DFIs are instruments of economic policy, whose performance must be evaluated predominantly by the social and economic benefits that their operations provide. They can fulfill two types of mandates:

- support to specific market segments that generate relevant socioeconomic impacts; or
- provide broad financing to several sectors/segments to foster the socioeconomic development of a given region or country.

The existence of public DFIs is justified by the presence of investment projects or sectors that require financing, but which are neglected by the private sector because of the greater uncertainty on future results. This is the case of more complex sectors and projects that require expertise for their economic-financial evaluation or that can generate positive externalities that transcend any short-term evaluation, such as in infrastructure projects, technological innovation, micro, small and medium-sized enterprises (MSME), microcredit, and environmentally sustainable projects. Public DFIs also assume the function of providing financial autonomy for the execution of public policies focused on fostering strategic development segments or that are a response to unexpected crises or catastrophes.

Recent views on the role of DFIs

Wruuck (2015) emphasizes that, in recent years, particularly within the European Union, discussions have intensified on the role of

DFIs and their ability to increase access to finance, particularly for MSMEs and long-term investments in infrastructure.

As a result of the international crisis, many European DFIs have become more active and are seen as one of the main instruments for dealing with both structural and cyclical difficulties in the economy.

A recent European Commission document (2015) on the role of national promotional banks in supporting the Investment Plan for Europe points to the importance of national development banks (BNF)[2] to improve the impact on investment, economic growth and employment.

The Investment Plan for Europe provided for the mobilization of at least € 315 billion in additional public and private investment in the real economy in three years. For the purposes of the plan, BNFs have been defined as legal entities that have carried out financial activities and which have been given a mandate by a member state or entity of a member state at the national, regional or local level for the purpose of implementing development.

The European Commission points out that the main economic reason for the existence of a BNF is the presence of market failures that affect the supply and demand of investments. It cites factors such as: the asymmetric information to economic agents, influencing the choices in risky and low knowledge environments; the fact that the social gains provided by project externalities are not perceived by private agents; and the market power as a resultant from the low level of competition. These shortcomings may lead to reduced investment and, therefore, slower future growth than would be economically efficient.

2 This section refers to national development banks (BNF) in the same sense as the DFIs, in order to maintain the original term used by the European Commission.

According to the European Commission, since BNFs are financed and supported by the State, they have a competitive advantage over private market operators and are better able to overcome market failures. Thus, the economic logic of BNFs performance should lie in their ability to facilitate financing where the market does not guarantee sufficient supply of private financing, or where private operators would have no interest in participating or should not intervene in any way.

The document notes that in recent years the BNFs activities have intensified in order to compensate for the necessary deleveraging of commercial banks, in addition to playing an important role in the implementation of the European Union's financial instruments. A number of member states that did not have a national development bank decided to create one, while others studied this possibility.

The European Commission also presents a list of recommendations for the legislative framework, regulations and governance structures of development banks to prevent risks and take full advantage of the benefits of these entities, notably:

- Bank statutes should clearly stipulate the focus on activities or sectors where market failures are widespread and in which there is insufficient coverage by commercial banks and other private credit providers.
- In order to avoid distortions in the market, regardless of the market failure to be addressed by the BNF, an *ex-ante* analysis should be conducted to assess the relative effectiveness and efficiency, to the interaction between the existing financing channels (private and public), and the financial instruments to be adopted by the bank.

- Prioritize projects of economic feasibility and sufficient profitability to maintain financial viability, avoiding continuous injections of capital by the State.
- They should respect the rules of transparency, accountability and professional management, and should adopt independent prudential supervision.
- The separation between the board of directors and executive management should be adopted.
- And they should adopt solid risk management and effective internal control procedures.

These measures seek to meet the increasingly pressing goal of improving corporate governance and, because they refer to public institutions, they aim to ensure operational autonomy to managers and directors of these institutions and also the institution's financial independence. These factors, as will be seen in several sections of this article, are fundamental in the renewal of the DFIs.

In addition, the European Commission has positively evaluated the contribution of BNFs to maintaining fair competition in the financial markets when they distribute their products indirectly through the commercial banking sector. Close interaction with the private sector can enable the BNF to adapt its product range to market failures. Moreover, it gives a positive signal about the possibilities of bank financing for certain types of projects that are excluded from their traditional investment policy, thus attracting private funds to their scope of activities, without hindering private sector activities. In this way, it is believed that indirect operations, through financial intermediaries, can reduce the risks of exclusion and discrimination of private financing and also ensure that benefits reach the final beneficiary.

Another important function of indirect operations is to transfer the knowledge acquired in new operations and new sectors with innovative financial products and others to the private sector. A product or program is tested by initially dividing the risk, and then the private partner is allowed to perform and assume the management of that product or program.

The document brings up an important shift in the view of the European Community, which used to be averse to development banks, as they were evaluated based on cost-benefit analyses and on maximizing efficiency in the allocation of public resources. The clear admission of the role and importance of the development banks and the encouragement to the creation of new banks represent a change in the more liberal view previously adopted, by admitting that DFIs may be important in channeling public resources to activities that, despite having negative present value, generate positive externalities.

Recently, the UN (2017) in the *Development Financing Report*, in its effort to globally implement the Agenda 2030 for Sustainable Development, added other relevant points to the role of development banks:

- They can mobilize financial markets resources at rates lower than those obtained by the private financial sector.
- They can mobilize private capital for specific projects through co-finance, providing guarantees and other instruments.
- Their experience enables them to improve the technical quality of projects by providing technical assistance, economic viability and dissemination of best practices.
- They can promote actions aligned with sustainable development and ensure that the public interest is obtained in infrastructure investments.

The report also points out that, as experience shows, a key point for the success of a DFI is the existence of a well-defined and precise mandate for development banks, especially the national ones, as specified by law and in line with a long-term development strategy associated to solid governance structures, ensuring that compliance and management teams detain banking experience.

Development financial institutions: some international experiences, especially regarding the relationship with the State

The intervention of DFIs (particularly development banks) in the provision of business credit especially focused on increasing productive capacity is a widespread resource, adopted in all types of economies, whether developed, developing or emerging.

According to Eslava and Freixas (2016), DFIs are not only numerous, but also widely diverse as to the tasks they perform and the models upon which they operate. Specifically for Latin America, Eclac (2016) warns of the challenges of financing development in our continent.

The importance of DFIs in the economies of their countries and of the world should not be underestimated. The combined assets of a sample of 11 DFIs totaled US$ 3.7 trillion in 2015, equivalent to 12% of the consolidated GDP of the respective countries (Table 1). In the comparison between the DFIs, the most important is the Cassa Depositi and Prestiti (CDP), with 24% of the assets in relation to gross domestic product (GDP), followed by the Korea Development Bank (KDB) with 19%, Kreditanstalt für Wiederaufbau (KfW) with 17%, and the China Development Bank (CDB) with 16%.

Regarding the relative size, CDB has the highest volume of assets, corresponding to almost three times that of KfW, the second largest institution. In turn, the German bank is more than twice the size of BNDES, which, however, has a significant participation in the Brazilian economy (13%).

It should be noted that the share of the Japan Finance Corporation (JFC) assets in GDP is less expressive (4.4%) than the previous ones, but this is due to the fact that the Japanese development system is segmented in several specialized institutions. Adding JFC's assets to those of Japan Bank for International Cooperation (JBIC), the share of GDP in these two DFIs reached 7.7% in 2014.

Table 1 • **Assets and GDP for selected DFIs**

DFIs	Assets (A) (US$ bi)	GDP (B) (US$ bi)	Share (A/B)
KfW (Germany)	547	3,289	16.6%
Vnesheconombank (Russia)	64	1,326	4.8%
Nacional Financiera (Mexico)	22	1,142	1.9%
Caisse des Dépôts et Consignations (France)	170	2,375	7.1%
Cassa Depositi e Prestiti (Italy)	433	1,780	24.3%
China Development Bank (China)	1,662	10,355	16.1%

(Continued)

(Continuation)

DFIs	Assets (A) (US$ bi)	GDP (B) (US$ bi)	Share (A/B)
Korea Development Bank (South Korea)	263	1,410	18.6%
Instituto de Crédito Oficial (Spain)	68	1,176	5.8%
Japan Finance Corporation (Japan)	206	4,622	4.4%
Business Development Bank of Canada (Canada)	15	1,553	1.0%
BNDES (Brazil)	236	1,769	13.3%
Total	**3,685**	**30,798**	**12.0%**

Source: ABDE (2016).

Note: Values converted to dollar based on the exchange rate on the last day of the year.

DFIs' areas of activity

As seen above, DFIs usually operate in sectors and segments not served by the private credit market, such as infrastructure, MSMEs, exports, innovation and the green economy (Table 2).

Many DFIs operate in several segments, such as KfW (Germany), KDB (Korea) and BNDES. Others are specialized in certain sectors or segments, such as JHC (Japan), in housing; ABC (China) and Rentenbank (Germany), both in agriculture; or in certain activities such as KfW's Ipex, in exports, or market niches, such as JFC (Japan) and Compañía Española de Reafianzamiento (Cersa), focused on MSMEs.

Table 2 • **DFIs' areas of activity**

		CDB (China)	KfW (Germany)	BNDES (Brazil)	CDP (Italy)	CDC (France)	JFC (Japan)	ICO (Spain)	KDB (South Korea)
Sectors	Agriculture	x		x			x	x	
	Infrastructure	x	x	x	x	x		x	x
	Industry	x	x	x	x	x	x	x	x
	Trade and services	x	x	x		x	x	x	
Size	MSME	x	x	x	x	x	x	x	x
	Large enterprises	x	x	x	x	x		x	x
Segments	Housing		x		x	x			
	Exports		x	x	x	x		x	
	Innovation	x	x	x	x	x	x	x	x
	Green economy	x	x	x	x	x	x	x	x
	Internationalization	x	x	x	x	x	x	x	x
	Capital market	x	x	x	x	x	x	x	x
	International financial cooperation	x	x		x			x	

Source: Além and Madeira (2015).

We can observe that the selected DFIs focus unanimously on the development of MSMEs. As for the segments in which they operate, they all support innovation, the green economy, the internationalization of companies and the capital market.

DFIs' relationship with the State

The relationship between the DFIs and the State consists, on the one hand, of the capital provision to these institutions, the transfer of financial resources and the granting of State guarantees in financial operations. On the other hand, it consists of the returns of operational results to the public treasures, in the form of dividends and tax collection.

The relations of the DFIs with the State are characterized by the direct and indirect benefits that vary, case by case and over time, as the institution becomes stronger and independent, and the institutional and legal environment changes according to economic and political transformations.

A most accurate data and information on the relationship of foreign DFIs with the respective public entities to which they are subordinated are difficult to obtain. The international experiences of development banks with transparency were detailed in the analysis of Madeira (2015). Based on the statutes and the reports of the institutions, in an interesting framework the author summarizes the financial regimes to which some selected DFIs are submitted (Table 3). In this survey, in addition to data and information from entities reports and documents, the study presented to ABDE sought to detail characteristics and specificities in each case.[3]

Table 3 • **Financial regimes of the selected DFIs**

DFIs	Indirect benefits				Direct benefits
	Payment of dividends to the State?	Payment of minimum mandatory dividend?	Collection of taxes?	Explicit state-guaranteed bonds?	Uses tax resources?
KfW (Germany)	N	N	N	Y	Y[6]
Vnesheconombank (Russia)	N	N	N	N[1]	Y
Nacional Financiera (Mexico)	N	N	Y	Partial[2]	N
Japan Finance Corporation (Japan)	Y	N	N	Y	Y
Japan Bank of International Cooperation (Japan)	Y	N	N	Y	Y

(Continued)

3 The report presented to ABDE contains a comparative analysis based on a questionnaire sent to 12 selected DFIs, with a list of questions about the characteristics and forms of relationship with their governments.

(Continuation)

DFIs	Indirect benefits				Direct benefits
	Payment of dividends to the State?	Payment of minimum mandatory dividend?	Collection of taxes?	Explicit state-guaranteed bonds?	Uses tax resources?
Business Development Bank of Canada (Canada)	Y	N	N	Y	N
Caisse des Dépôts et Consignations (France)	Y	N	Y	Y	N
Cassa Depositi e Prestiti (Italy)	Y	N.D	Y	Partial[3]	N
China Development Bank (China)	Y	N.D	Y	Partial[4]	N
Korea Development Bank (South Korea)	Y	N	Y	Partial[5]	Y
Instituto de Crédito Oficial (Spain)	Y	N	Y	Y	Y
BNDES (Brazil)	Y	Y	Y	N	Y

Source: Madeira (2015).

Notes: 1 – Despite it not being in the statute, some titles are state-guaranteed. 2 – For commitments to national natural persons and foreign companies/governments and for deposits of governments and corporations. 3 – For saving deposits via postal institutions. 4 – For bonds in possession of the local banks. 5 – For debts in foreign currency and for bonds related to the industrial policy. Losses compensated in case of absence of reserves. 6 – Only for some previously established programs, being a small part of the total.

We can observe a wide variety of institutional arrangements, financial regimes and relationship models between the DFIs and their respective public controllers with respect to funding and state guarantee; payment of dividends; tax payment; and regulation and compliance to Basel Agreement.

Funding and state guarantee

There are different ways for DFIs to obtain funding for their operations, among which are included savings and deposits from individuals, loans from another financial institution, through fundraising in the domestic and international capital markets, using own equity or returns on equity, and resources from government budgets. Each DFI uses a certain combination of these possibilities.

Among the 12 selected DFIs, seven use fiscal or *quasi-fiscal* resources, especially BNDES, which has access to a fund that foster employment, the Workers' Assistance Fund (FAT) to cover its disbursements, while the others do not have this type of access. On the other hand, six of them have explicit full state guarantee to their commitments and four have partial guarantees, that is, only on certain securities or bonds. In the case of the Bank of Russia, although there is no provision in its statute, some bonds are issued with government guarantee. Only BNDES does not have an explicit guarantee from the government on its obligations, which increases its market funding costs.

Michie and Wishlade (2013) point out that, in the German case, the Federal Government hold 80% of the shares of the KfW group, while the remaining 20% are held by the German regional states. While KfW was originally funded by the Marshall Plan, it currently raises about 80 percent of its capital needs in the capital market, with a smaller percentage of its funding being provided by the Federal Government to reduce interest rates in certain types of financing (e.g., for energy efficiency projects).

According to KfW (2013), the decisive factor for the success of the group was the fact that, from the outset, the bank distributed resources in the form of loans rather than subsidies. As soon as the installments came to a completion, the incoming could be used for new loans. As a result, KfW still have Marshall Plan fund's available to promote entrepreneurship programs and small and medium-sized businesses, known as European Recovery Program (ERP), the official name of the Marshall Plan.

Indeed, by not paying dividends to the State, the returns on loans and realized profits could be capitalized and used for new loans, which strengthened KfW's corporate capital and expanded its position over time. As KfW also receives budgetary resources, it provides loans on more favorable terms for priority segments. That is, the budgetary resources are used to concessional loans with subsidies (difference between market interest and the rates charged on granted loans).

The KfW group is one of the largest and most active bond issuers in the world. According to a financial report (KfW, 2015), in 2015 more than 175 bonds in 14 currencies of the total volume of € 62.6 billion were sold to international investors, corresponding to almost 80% of their resource requirements in the year. The great differential of the bank's refinancing instruments is security, since they are explicitly and directly guaranteed by the Federal Republic of Germany. KfW has an AAA credit rating by renowned international agencies such as Fitch Ratings and Standard & Poor's,[4] which allows for very favorable borrowing and ensures that these conditions are offered also in its loans.

The German government occasionally contributes with budget resources to KfW's capital, as happened in 2010, as indicated by the IMF (2014), and to the states (Laender) corresponding to 1.1% of GDP, with the purpose of counterbalancing effects of the international financial crisis. Often, the bank adopts a mix of interest rates derived from funds of federal budget and market

4 Recently, KfW has begun to issue the so-called Green Bonds (Made by KfW), designed to give investors the possibility to invest in climate protection and encourage support for environmental protection activities.

funding in its financing programs, thus reducing and improving the conditions offered for its loans.

The Italian and French institutions, although they do not receive fiscal resources, are managers of savings deposits and, therefore, have access to stable sources for their development promotion activities. In 2015, of Italy's total CDP funding, € 323 billion, 78% came from postal savings, while bank funding accounted for 5.4%, client funds, 12.3%, and issuance of securities, 4.3%. To diversify sources, channels and fundraising instruments, CDP (2015) launched the first retail bond of € 1.5 billion, which was fully successful, given the excess demand for the maximum amount offered. The funding of the Caisse des Dépôts et Consignations (CDC) of France, according to Madeira and Martini (2015), is diverse, consisting mainly of savings deposits (35%), as well as accumulated reserves, securities issuance and financial market.

Regarding the Spanish case, the Instituto de Crédito Oficial (ICO) is a 100% state-owned bank, linked to the Ministry of Economic Affairs and Competitiveness, through the State Secretariat for Economic and Business Support. The institution does not finance its activities through the state budget, but raises funds mainly in the capital market. When appropriate, the Spanish government may increase the capital of ICO in order to maintain its equity participation and enlarge its lending capacity. In addition, the debt instruments issued by ICO are backed by the direct, explicit, irrevocable and unconditional guarantee of the Spanish State, thus carrying low risk.

The Japanese banks, JFC focused on supporting MSMEs, while JBIC focused on supporting international business transactions and exports through loans, guarantees and equity participation, are exempt from tax. They also receive fiscal resources for their operations, usually from budget contributions linked to specific programs. They also have an explicit state guarantee.[5]

The Japanese government holds all outstanding JBIC shares, with the bank's revenue and expenditure budget being submitted to the Finance Minister.[6] The bank finances its operation through various sources of long-term resources, including loans from the Tax and Investment Program (Filp), issuance of foreign securities, capital contribution from the government and loans from the Special Account of the Foreign Exchange Fund. All such forms of financing are included in the national budget as an item in the general budget or as an item in the budget of the special account.

The issuance of JBIC bonds in the international market is guaranteed by the government. The amount of this type of funding corresponded to 20.6% of total loans and bonds in 2014. These bonds received the same rating as the Japanese government by the major rating agencies (A1 of Moody's and AA- of Standard & Poor's in July 2015). In addition, JBIC issues government unsecured securities in the domestic capital market, having received the same rating as government-guaranteed securities.

In China, the CBD's shares are owned by the Ministry of Finance (50%), by Central Huijin Investment Ltd., which is a state-owned investment company (48%), and by the National Council for Social Security Fund (2%). According to Madeira (2015), CDB issues most of its securities to local banks and in this case there is a state

5 The information is contained in the questionnaire attached to the ABDE Report.

6 When budget contributions to JBIC are made, they must be paid during the fiscal year in which they were made, except for cases of resource shortage, when the bank can refinance them to be paid in one year.

guarantee. This way of placing the securities guarantees capillarity in fundraising. In 2016, CDB received a capital injection of US$ 48 billion from the Chinese Central Bank to expand its activities.

The South Korean government holds 100% of KDB shares. Além and Madeira (2015) point out that its funding is diverse and has been changing over time. Initially, two-thirds of its funding consisted of central bank transfers, while the rest came from a variety of sources, such as public deposits, government loans, and funding from multilateral financial institutions and foreign banks. Currently, 60% of its funding comes from the issuance of bonds, 19% from loans, and 17% from term deposits (balance sheet data for 2014). According to Madeira and Martini (2015), KDB also manages two public funds: the Development and Economic Cooperation Fund and the Inter-Korean Cooperation Fund (IKFC).[7] The Korean government provides capital to KDB when necessary. In addition, it provides full guarantee on its debt refinancing. KDB's fundraising receives favorable risk assessments from major international companies, AA3 from Moody's and A+ from Standard & Poor's.

In Canada, the Business Development Bank of Canada (BDC) is solely owned by the Canadian government. This bank is the leader in the segment in which it operates in the country, the support for MSMEs. It provides loans, venture capital, guarantees and consulting services to small enterprises, focusing on technology and exports. At government request, it manages the Venture Capital Action Plan (VCAP), which is aimed at technology firms. In addition to acting

7 According to article 32 of the statute, "KDB's annual net losses are to be offset each year by the reserve, and if the reserve is insufficient, the deficit should be offset by the government." Information from the questionnaire attached to the ABDE Report.

directly, BDC partners with other financial institutions, providing capital to financial intermediaries, in order to encourage other institutions to provide support for Canadian businesses.

Even when they do not directly receive fiscal or parafiscal resources, DFIs often have access to a variety of institutional funds. A significant example is the European Union Funds or the use of co-financing with the European development banks, mainly for MSME projects. Under the Operational Program (OP) negotiated and agreed by the European Commission for the 2007-2013 period, the German regional development banks used these funds intensively to co-finance some of their financial instruments. Michie and Wishlade (2014) point out that the Spanish ICO managed the Jeremie Fund during this period, providing guarantees for RTDI (Research, Technological Development and Innovation) projects.

Payment of dividends

Among the 12 banks analyzed, three are exempt from paying dividends: KfW, in Germany; Vnesheconombank, in Russia; and Nacional Financiera, in Mexico. The others may distribute dividends to the State.

Each institution adopts a policy for distributing results, although it is not possible to acknowledge it only through company reports and balance sheets. In the case of ICO, the profits obtained by the institution are distributed observing the legislation (ICO Bylaw, article 19), which establishes the following order of priority:[8]

8 Information from the questionnaire attached to the ABDE Report.

- Establish necessary reserves so that their own resources are not less than that corresponding to regulatory rules on capital for financial institutions.
- Make allocations to the fund provision referred to in the Royal Decree 12/19951, when instructed by the Minister of Economy and Competitiveness.
- Establish a voluntary reserve, which must be proposed by the ICO president and approved by the Minister of Economy and Competitiveness.
- Transfers to the State Treasury.

KDB, in turn, adopts the following rules for profits allocation:

- Forty-percent of profits go to the reserve accounts.
- An additional amount calculated by supervisory rules related to banking legislation will be reserved for the provision on loan default.
- The remainder will be distributed to the shareholder, according to an agreement between the Minister of Strategy and Finance and KDB.

In general, development banks are not required to pay mandatory minimum dividends. In our sample, only BNDES has the obligation, provided for in its bylaws, of a minimum mandatory transfer to the Union of 25% of the profits earned.

Since the purpose of the DFIs is not to maximize profits, they should not have their performance evaluated solely by their results, because the priority of this type of institution is, in general, to increase social welfare and economic development. It is normal for some segments to show greater default rates than others, especially in moments of crisis. Thus, banks that operate in a diversified way can mitigate risks, as they can compose their portfolio with different companies and sectors, offsetting possible losses in more vulnerable segments.

Most DFIs have positive results even though their goal is not to maximize profitability, showing that there is a concern for risk management and governance. According to Luna-Martínez and Vicente (2012), only 14% of a sample of ninety development banks in the world suffered losses in 2009. It is worth noting that when profits are reinvested, they help in the institutions' capitalization and in their ability to obtain resources in the market.

Based on balance sheet of the 12 DFIs (Table 4), nine showed profits (KfW, National Financial, CDC, CDB, KDB, ICO, JBIC, BDC and BNDES), while three experienced losses (Vnesheconombank, CDP and JFC). The high loss of the CDP group (€ 859 million in 2015, corresponding to US$ 934 million) was due to the losses of € 2.9 billion in the subsidiary ENI, an Italian energy company in the oil, gas and petrochemicals sector. The market fragility of oil industry eroded operating profits and values of the group's assets. As for the Russian bank, the report does not clarify the cause of the losses. In turn, the JFC, which focuses on supporting MSMEs, did not suffer significant losses (0.8%).

Considering the relation between profit/loss and equity, which gives an idea of the institution's profitability, we can observe that this indicator shows great variation. Of the nine institutions that obtained profits, BNDES had the largest ratio (20%), followed by CDB (14.4%) and BDC (10.3%). In the case of the others, this ratio ranged from 0.6% (ICO) to 8.6% (KfW). This shows that despite they do not aim at profitability but at generating favorable effects on the economies of their countries, DFIs can deliver positive results if they adequately manage their resources and ensure a balanced risk assessment.

It is undeniable that the financial sustainability of these institutions is essential to the fulfillment of their respective mandates. In this sense, DFIs that are not obliged to distribute dividends, or which do so only in part, enjoy additional advantages due to the possibility of incorporating capital-based profits, with the consequent increase in the institution's lending capacity.

Table 4 • **Result (profit/loss) in relation to equity**

DFIs	Profit/loss – after taxes (A) (US$ thousand)	*Equity* (B) (US$ thousand)	Profit/equity ratio A/B
KfW (Germany)	2,363	27,420	8.60%
Vnesheconombank (Russia)	-4,129	6,261	-65,90%
Nacional Financiera (Mexico)	75	1,133	6.60%
Caisse des Dépôts et Consignations (France)	1,415	38,235	3.70%
Cassa Depositi e Prestiti (Italy)	-934	36,539	-2.60%
China Development Bank (China)	15,820	109,672	14.40%
Korea Development Bank (South Korea)	1,440	28,817	5.00%
Instituto de Crédito Oficial (Spain)	37	5,812	0.60%
Japan Finance Corporation (Japan)	-300	37,577	-0.80%
Japan Bank of International Cooperation (Japan)	1,052	19,873	5.30%
Business Development Bank of Canada (Canada)	354	3,449	10.30%
BNDES (Brazil)	1,571	7,852	20.00%
Total	**18,764**	**322,641**	**5.80%**

Source: ABDE (2016).

Note: Values converted to dollar based on the exchange rate on the last day of the year.

Taxation

Considering the ABDE Report, of the 12 banks studied, four are exempt from tax collection (KfW, Vnesheconombank, JFC and Business Development Bank of Canada), while the others are required to collect Income Tax.

According to the Germany Association of Public Banks (VÖB, 2014), the KfW group, as a public development institution, is considered a nontaxable public-law institution, exempt from corporate taxes and commercial tariff obligations. The law that created KfW, in 1948, explicitly defined the tax regime of this bank, providing for tax exemption.

Nonetheless, the KfW group income statement in 2015 accounts for € 130 million relating to income taxes, which corresponds to 4.9% of profits from operational activities in the year. According to the group report, this figure refers to income taxes of nonexempt subsidiaries and their affiliates, determined in accordance with the tax laws of the country of residence.

Similarly, Vnesheconombank, although statutorily exempt from taxes, also recorded a residual amount in its balance sheet, probably due to some specific taxable activities.

It is interesting to note that the ICO was exempt from Corporate Income Tax, from 1993 to 1996, as established by Royal Decree 3/1993. Subsequently, in accordance with the provisions of Transitional Law 43/1995 on Corporate Income Tax, the institution was exempt from this tax in 1997 and 1998, but in 1999 it became subject to the General Income Tax.

In the case of JBIC, since it is a public corporation as defined by the corporation tax law, it enjoys corporate tax exemption. In addition, it is exempt from other taxes as provided by different laws. The rationale for these benefits is that JBIC is totally different from private commercial banks in nature, object, and mission.

It should be noted that KDB is treated in the same way as other financial institutions. However, according to the bank, it is possible that partial exemption from income tax would be granted under a special tax treaty on financial institutions that act as a central bank or perform governmental functions.

Table 5 shows the amounts paid as income tax from various banks and its comparison with profits received. The most profitable institutions were KDB (37%) and Instituto de Credito Oficial (36%), followed by BNDES (33%) and CDC (26%). In the case of CDC, the high loss of the group, due to the negative result of the subsidiary company ENI, distorts the relation between the Income Tax and its result shown in corporate accounts (146%).

Table 5 • **Income Tax in relation to result (profit/loss)**

DFIs	Income Tax (A) (US$ thousand)	Profit/loss – before taxes (A) (US$ thousand)	Profit/loss – after taxes (A) (US$ thousand)	Participation (A/B)
KfW (Germany)	141	2,880	2,363	4.91%
Vnesheconombank (Russia)	43	-4,086	-4,129	-1.05%
Nacional Financiera (Mexico)	23	97	75	23.17%
Caisse des Dépôts et Consignations (France)	497	1,922	1,415	25.88%
Cassa Depositi e Prestiti (Italy)	560	-382	-934	-146.44%
China Development Bank (China)	5,048	20,867	15,820	24.19%
Korea Development Bank (South Korea)	840	2,281	1,440	36.84%
Instituto de Crédito Oficial (Spain)	21	57	37	35.80%

(Continued)

(Continuation)

DFIs	Income Tax (A) (US$ thousand)	Profit/loss – before taxes (A) (US$ thousand)	Profit/loss – after taxes (A) (US$ thousand	Participation (A/B)
Japan Finance Corporation (Japan)	0	-300	-300	0.00%
Japan Bank of International Cooperation (Japan)	0	1,052	1,052	0.00%
Business Development Bank of Canada (Canada)	0	354	354	0.00%
BNDES	829	2,475	1,571	33.49%

Source: ABDE (2016).

Note: Values converted to dollar based on the exchange rate on the last day of the year.

Regulation and the Basel Accord

In a sample of four development banks (BNDES, China Development Bank, Japan Finance Corporation and KfW), Além, Ferraz and Madeira (2013) verified that BNDES is the only one regulated by the same institution that oversees private banks, the Brazilian Central Bank.

KfW and JFC are regulated directly by the responsible ministries, while CBD is supervised by the central government. In the case of ICO, the State Secretariat of Economy is responsible for the strategic management and for the results evaluation and activities control.

Typically, the DFIs are regulated by specific legislation and are not formally subject to the rules defined by the Basel Accord on banking supervision and liquidity and capital standards. This results in greater operational flexibility for these institutions, which have distinct characteristics and objectives from those of the commercial banking sector.

Nevertheless, all these banks seek to follow some of the rules that govern the private sector, including those relating to the Basel Accord. KfW voluntarily applies certain rules of the German Banking Act, including the capital requirement. The CBD monitors its capital requirement levels based on the Commercial Banks Capital Adequacy Management Guidelines. Because JBIC is considered to be distinct from private banks, it is not subject to the Basel Accord, although it does recognize the importance of risk management and adopts integrated risk management. ICO complies with the provisions of national law governing credit institutions in general, based on the Basel Accord. In turn, KDB has informed that it is subject to the rules of the Basel III Accord.

Some lessons from international experiences

The importance of DFIs for national and local economic development is justified both because they overcome structural difficulties in long-term financing in certain segments or activities and because they counterbalance the natural decline in the private credit market in times of crisis. Countries at different stages of development have used and continue to use this instrument intensively to support their investment policies. Even in developed economies with complex and advanced economic structures, the performance of DFIs, particularly development banks, remains fundamental. This is the case, for example, of Germany, which has two long-term development institutions and a strong network of regional development banks.

In the context of the recent global crisis and post-crisis periods, new economic, social and environmental challenges were posed; both for developed and less developed countries, and only increased the importance of credit and development alternatives provided by DFIs.

The mandates and goals of the DFIs vary according to the needs and specificities of each country, undergoing adjustments throughout their development process. There is no single model for the structuring and operation of DFIs, which may vary in relation to the structure of ownership (totally or partially state-owned), the focus of activities (restricted or broad) and the distribution form of their financing (direct or indirect).

The relationships between a DFI and the State also differs, such as in the funding structure (budget resources, public loans, securities issuances), dividend payment (exempted or not), tax payment (total, partial or identical to the private sector) and regulation and supervision of activities.

For them to be financially sustainable, it is necessary, on the one hand, to provide DFIs with stable and sustainable sources of resources. On the other, to ensure that there is adequate risk management of the loan portfolio and good governance, without hindering the fulfillment of their mandates.

In emerging economies with a history of instability, access by DFIs to fiscal or parafiscal resources can be considered vital (as in the case of Brazil). But in advanced economies or in those with more balanced competitive conditions, institutions can be funded only with the return of loans, provided that they are granted to finance viable projects.

In order to serve the function of fostering investment and promoting economic activity, especially private, the most important aspect of DFI financing is that it should count on a stable source of resources, and even when those funds are public, they should not depend on political decisions that are vulnerable to momentary instabilities and subject to short-term imbalances. Originating in the fiscal budget or not, whether it is a regular transfer or a one-time capitalization contribution, it is also important that the allocation by the DFI should be decided by technical criteria and be immune to specific interest groups but subject and aligned, however, to the socioeconomic development strategy of long-term sustainability.

An emblematic case is KfW, which receives a wide range of direct and indirect benefits from the State. If, at the outset, budgetary resources made up almost entirely the bank's funding, with subsequent loan returns and the strengthening of the bank and the economy, the composition of its funding changed, becoming increasingly based on its own resources raised mostly in the capital markets. The government's biggest benefit to KfW has become the explicit state guarantee for its obligations, which enables the bank to raise funds in the market at extremely favorable terms and rates, and grants the transfer of these conditions to its clients.

Also worth mentioning is the case of BNDES, which regularly receives fiscal resources from FAT, corresponding to tax collection linked to the federal fiscal budget. Since this allocation is constitutional stipulated, it is not vulnerable to decisions that may change from year to year. In this case, the financial and operational autonomy of the main Brazilian DFI is ensured by the Brazilian Federal Constitution, even though originating in fiscal and budgetary resources.

Also important for the strengthening of the capital base and the funding capacity of the KfW group and other development banks is the nonpayment of dividends and the exemption or reduction of taxes. In the Brazilian case, BNDES and state development banks and agencies are obliged to pay dividends to their public controllers, reducing the sources of funds for their loans.

In turn, regulatory and supervisory rules are important to ensure good governance, adequate risk management and financial sustainability of the DFIs. However, international experience shows that, in principle, it would not be appropriate to adopt exactly the same rules applied to the private financial system, but rather to adapt them to the characteristics and mandates of these institutions. For example, the minimum capital requirement under the Basel Accord for higher risk loans may induce a DFI to lend to lower risk companies and projects, reducing their ability to finance projects in priority sectors.

Finally, it should be remembered that, in Brazil, the private credit market has a chronic problem of restrictions on long-term financing, given the restricted capital market, high interest rates, preference for the liquidity of private banks and investor risk aversion, and an institutional environment of uncertainty and insecurity for creditors.

Having an institution of the size and importance of BNDES, which has a stable resource base for financing segments and sectors that are not attractive to the private market, represents a significant advantage, especially in the current economic recession. In a context of economic crisis and increasing need for investments in infrastructure and strategic segments to boost the economy, it is necessary to think of ways to strengthen BNDES, as well as the regional banks and development agencies, and diversify their sources of financing.

In view of the model of a financial system such as in Germany, composed of two national development banks (KfW and Rentenbank) and a strong network of regional banks, some measures should be studied. These included the reduction of the tax burden, the concession of explicit government guarantees in the refinancing of their obligations, and the review of the rules of regulation and supervision of activities in order to adapt them to DFIs' characteristics and purposes, while observing the need to adopt good governance and risk management practices. At the same time, the effectiveness of the DFIs disbursements in the transformations of the productive base should be assessed to ensure that the financing is channeled to the strategic and priority development segments.

Some authors observe that international experiences show that most DFIs incur higher financial costs than the corresponding private banks, while BNDES is one of the few offering lower rates and hence inevitably seen as a competitor of private banks. In other countries, even at a higher cost, clients can choose to borrow from a DFI because they can have access to an associated quality advisory service for their projects, and because they prefer to remain as a long-term DFI client.

Even with overheads costs higher than most private commercial banks, DFIs are often able to raise funds at lower rates than their private partners, as the UN report found. As for financial institutions focused on the long-term and committed to promoting viable economic activities and sustainable development financing, frequent access to the credit market creates competition and contributes to the strengthening of the financial market, because as a broad and inclusive source of funds, they influence the market to offer competitive rates.

Comparisons between foreign DFIs also reveal a very important effect on taxation, and on profits distribution to the state controller. It is well known that tax systems are different, as well as their tax burdens, but the taxation of corporate income tends to be even more differentiated. In the Brazilian case, where high rates are applied on profits, there is still an additional tax on financial institutions, underestimating the effective taxation on BNDES. As taxes and dividend payments inevitably translate into larger spreads, the result is that BNDES's rates are, for example, higher than those of the Inter-American Development Bank (IDB) and the World Bank.

A renewed BNDES

Relationship with the state

The 1988's Federal Constitution altered the relationship of BNDES with the state when it established its main source of funds:[9] it made it an institution independent of the federal budget. Until then, the institution had to negotiate its budget every year with the Federal Government, but now it became a development bank in the most modern sense. The Constitution also provided for its transition to a profitable state-owned enterprise and a dividend provider for the Federal Government. The Federal Government's economic development priorities now direct the BNDES Operational Policy,

9 The Federal Constitution of 1988 established that at least 40% of the collection of contributions to the Social Integration Program (PIS) and to the Civil Servant Investment Program (Pasep) would be allocated to BNDES for the financing of economic development programs. In 1990, the National Congress created the Workers' Assistance Fund (FAT) and linked the PIS-Pasep funds to its capitalization.

which became subject to the regulation of the Brazilian Central Bank, to ensure that the best banking practices at the time would be pursued.

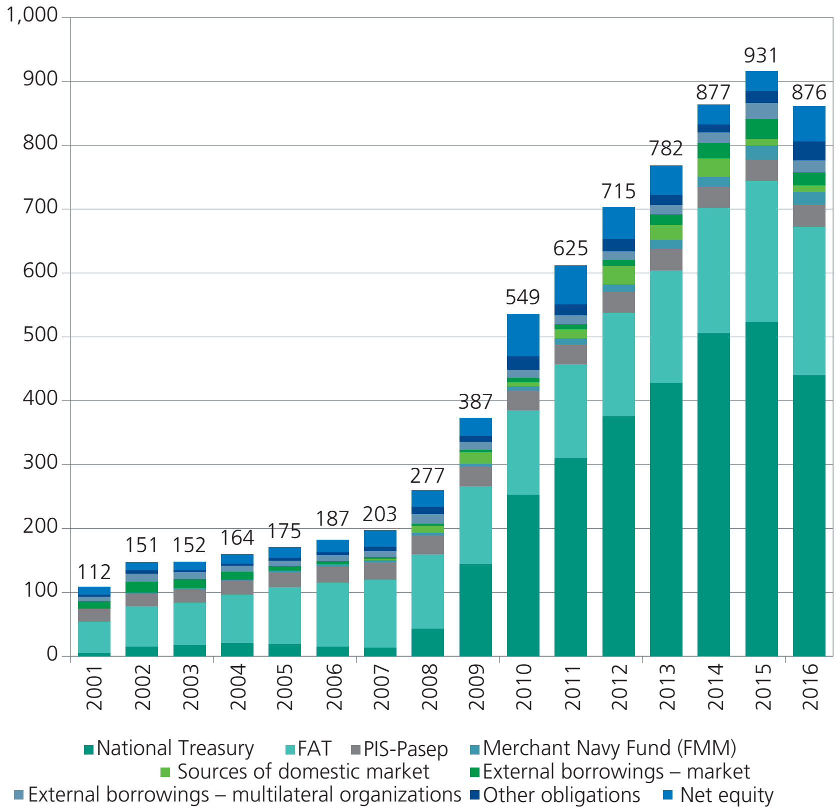
Thus, FAT obtained the expected return and gradually directed special deposits to BNDES, when the regular transfers were insufficient. In addition to these permanent sources of resources, there are other important sources, such as those from the return of projects and international funding. Almost twenty years have passed, a sufficient time to consolidate management practices, following these best practices.

In the wake of the 2008-2011 international crisis, however, the National Treasury (TN) began to make loans to BNDES (and to other state-owned banks) through the issuance and direct delivery of securities, making it subordinate and dependent on a cheap resource. FAT, which corresponded to more than 50% of the resources until 2007, was replaced by the TN, reaching almost 58% of the sources of funding in 2014 (Chart 1). Resources were also occasionally raised from international funding, usually with higher costs. The excessive use of these resources has contributed to the deterioration of the fiscal situation of the state.[10] This process was interrupted in December 2015, when FAT became again the main source of BNDES's funds. The accumulated amount received from the TN, from 2009 to 2017, totaled almost R$ 661 billion.[11] But the financial independence from the government has been partially restored.

10 See Afonso (2017).

11 Of these, R$ 361 billion (March 2017) were invested in equalizable programs by TN to BNDES. That is, 54% incur additional costs arising from the difference between TN funding and the rates imposed on BNDES by the Federal Government. The average rate for the final client is 5.2% p.a. A parafiscal source, without significant costs to society, was replaced by funds raised at market prices by TN and disbursed at an average rate lower than FAT's funding.

Chart 1 • **BNDES Liabilities, Financial Statements on December 31**



Sources: BNDES (2017) and BNDES Audited Financial Statements (2001 and 2016), available at www.bndes.gov.br.

Flow of resources between BNDES and the Federal Government: taxation and dividends

The BNDES's dividend distribution policy is defined in its bylaws, which establishes a minimum payment of 25% of the net profit to the Federal Government, respecting the prudential and minimum corporate capital limits. However, under Law 13,303 of June 30, 2016, which regulates state-owned enterprises, new rules were established on the dividend policy, with a destination of at least 40% of the profit for capitalization. As a result, the strengthening of BNDES's capital structure is expected. We can observe in Table 6 that BNDES has been an important source of taxes and dividends for the Federal Government, especially since 2008.

Table 6 • **BNDES payments of taxes and dividends to the Treasury - 2001 to 2016 (R$ million, in current values)**

Year	Dividends paid in the year (A)	Taxes paid in the year (B)	Total (A+B)
2001	550	964	1,514
2002	497	1,565	2,062
2003	607	781	1,388
2004	265	1,581	1,846
2005	1,429	1,992	3,421
2006	3,566	1,990	5,556
2007	405	2,284	2,689
2008	6,017	3,486	9,503
2009	10,950	2,121	13,071
2010	8,725	5,954	14,679
2011	6,905	2,687	9,592
2012	12,938	5,135	18,073
2013	6,999	5,643	12,642
2014	9,080	5,991	15,071
2015	4,972	5,215	10,187
2016	217	8,188	8,405
Total	**74,121**	**55,577**	**129,698**

Source: BNDES (2017).

Another relevant aspect of the Law of State-owned Enterprises was to establish rules for the appointment of executive directors and members of the Advisory Board, privileging the technical and banking management experience in the selection of its members. The law also amends the rules of governance, of controllership, the bylaws and the internal regulations. The expected result is increased transparency, modernization of processes and controls, and new commitments to the effectiveness of operational policies.

Final considerations

This article aimed to review concepts and explore the experience of DFIs around the world, with an emphasis on governance and the relationship with the state. The objective is to reflect on certain points in order to strengthen and stimulate the renewal of the main Brazilian development institution towards what is observed internationally as best practices.

International experience shows that, in order to be financially sustainable, it is required, on the one hand, to provide DFIs with stable and sustainable sources of resources and, on the other, to ensure that there is adequate risk management of the loan portfolio and good governance, without hindering the fulfillment of their mandates. In emerging economies with a history of instability, the access of DFIs to fiscal or parafiscal resources can be considered vital, as is the case in Brazil. But in advanced or more balanced economies, institutions may be funded only with the return of loans, provided they are granted for economically viable projects.

In order to foster investments, promote private economic activity and stimulate the business environment, the most important factor in the financing of DFIs is to ensure they have a stable source of resources and, even if those resources are public, that they are not dependent on short-term policy decisions and thus vulnerable to specific interest groups as opposed to the social interest. Originating in the fiscal budget or not, being a regular transfer or a one-time capitalization contribution, it is also important that the allocation by the DFI be decided by technical criteria, with the greatest transparency possible, enabling it to meet the demands of the society to which it is the main institution for sustainable economic development.

In the case of BNDES, which regularly receives fiscal resources from FAT and mandatory transfers from the federal fiscal budget, the allocation is stipulated by constitutional determination. It is therefore not vulnerable to policy decisions that may change from year to year. In this case, the financial and operational autonomy of the main Brazilian DFI is ensured by the country's Federal Constitution, even though its main source of funds is fiscal and budgetary resources.

International experience shows that most DFIs incur higher financial costs than the corresponding private banks, with BNDES being one of the few offering lower rates. Clients abroad can choose to finance themselves with a DFI because they can have a quality project consulting service and at the same time remain as clients, even if the cost is higher.

The comparisons show a very different effect on taxation and distribution of profits to the state controller. Tax systems are different, as well as tax burdens and corporate taxation. In the Brazilian case, where high rates are levied on profits, especially on the banking system, the income tax tends to underestimate the effective taxation of BNDES.

The relationships between the DFIs and their state controller should be regarded in the larger context of the economy. In the post-crisis period, new economic, social and environmental challenges were posed, both for developed and less developed countries, and only increased the importance of credit and development alternatives provided by the DFIs. That happened especially because only DFIs have unequivocal commitments to the long-term well-being of the population.

Following the example of the successful German model, some measures could serve as a guide for other DFIs, especially the Brazilian one. They consist of: the reduction of the tax burden, granting of guarantees by the controlling government in the refinancing of its obligations, and the overhaul of the rules of regulation and supervision to adapt them to DFIs' characteristics and purposes, without, however, jeopardizing good governance practices and risk management. In order to strengthen the capital base and the financing capacity, it would also be desirable not to pay dividends or to reinvest them.

It has become a rule of good banking practice to evaluate the effectiveness of DFIs' investments in transforming the productive base to ensure that financing is properly directed to strategic and priority development segments, accompanied by transparency and corporate responsibility.

In Brazil, having an institution like BNDES represents a significant advantage, especially in the current economic recession. In addition, with the need for increasing investments in infrastructure and strategic segments, it is necessary to expand its sources of funding and its network of partnerships and co-financing with the market.

BNDES, which has been renewed in governance, transparency and risk management, is preparing itself for the new demands. The change in dividend distribution rules also helps to strengthen the capital structure. There is still a long way to go in relation to socioenvironmental priorities and the evaluation of the effectiveness of its activities, but the institution clearly responds with responsibility to the demands of the Brazilian society and is instrumental in meeting the challenges that are to come.

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